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UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE BOARD OF PATENT APPEALS AND INTERFERENCES

Ex parte CHRISTOPH LINDENSCHMIDT, REINHARD BERGER, ALEXANDER SCHWEIZER, and MARTIN ZIMMERMANN

Appeal 2008-0735 Application 10/807,030 Technology Center 3600

Decided: May 30, 2008

Before TERRY J. OWENS, JENNIFER D. BAHR, and ANTON W. FETTING, Administrative Patent Judges.

OWENS, Administrative Patent Judge.

DECISION ON APPEAL

STATEMENT OF THE CASE

The Appellants appeal from a rejection of claims 1, 2, 4-6, and 14-16. Claim 3, which is the only other pending claim, stands objected to but allowable if rewritten in independent form.

THE INVENTION

The Appellants claim a device and method for controlling an electrically operated holding magnet of a motor vehicle transmission's parking lock. Claim 1 is illustrative:

1 A device for controlling an electrically-operated holding magnet of a parking lock of a motor vehicle transmission, the holding magnet being supplied with power via a transmission control resettable to a basic setting and for holding the parking lock in a disengaged state, the device comprising:

an apparatus for bridging a reset operation of the transmission control, the apparatus maintaining a power supply of the holding magnet during the reset operation.

THE REFERENCES

| Knappe | GB 1,119,957 | Jul. 17, 1968 |
|----------|-----------------|---------------|
| Sponable | US 5,827,149 | Oct. 27, 1998 |
| Gierer | US 6,471,027 B1 | Oct. 29, 2002 |

THE REJECTIONS

The claims stand rejected under 35 U.S.C. § 103 as follows: claims 1, 2, 6, and 14-16 over Gierer in view of Sponable, and claims 4 and 5 over Gierer in view of Sponable and Knappe.

OPINION

We reverse the Examiner's rejections. We need to address only the independent claims, i.e., claims 1 and 14. Claim 1 requires "the holding magnet being supplied with power via a transmission control resettable to a

¹ The Examiner does not rely upon Knappe for any disclosure that remedies the deficiency in Gierer and Sponable as to the independent claims (Ans. 4).

basic setting" and "an apparatus for bridging a reset operation of the transmission control, the apparatus maintaining a power supply of the holding magnet during the reset operation." Claim 14 requires "the holding magnet being supplied with power via a transmission control resettable to a basic setting" and "maintaining the power supply of the holding magnet during a reset of the transmission control."

Gierer discloses an automatic transmission (20) parking brake (18) activated by a signal triggered via a control device (19) (col. 2, Il. 65-67). Control device 19 is shown as being connected to a magnet (5) that holds parking brake 18 in the disengaged position (col. 2, Il. 33-63; sole fig.). The Examiner relies upon Gierer's control device 19 as corresponding to the Appellants' transmission control (Ans. 3).

Sponable discloses "[a]n electrically powered park lock actuator for use with an automotive vehicle transmission" (abstract). Sponable teaches that "[a]s long as transmission 12 remains in a gear range other than Park, ECU [electronic control unit] 18 leaves lock actuator 10 deenergized so that lock pawl 94 maintains the unlocked position shown in FIG. 6, thus permitting output shaft 14 to be driven by the engine and/or to 'free-wheel' if the vehicle is coasting or in Neutral' (col. 5, 1l. 60-65). The Examiner relies upon Sponable's neutral gear as corresponding to the Appellants' transmission control basic setting (Ans. 7-8).

During patent prosecution, claims are to be given their broadest reasonable interpretation consistent with the Specification, as the claim language would have been read by one of ordinary skill in the art in view of the Specification. *See In re Zletz*, 893 F.2d 319, 321 (Fed. Cir. 1989); *In re Sneed*, 710 F.2d 1544, 1548 (Fed. Cir. 1983). Regarding the reset to a basic

setting, the Appellants' Specification states that "[s]uch electronic control systems may be reset to a fixedly-defined basic setting using a reset device" (¶ 0006), and that "such a reset may also occur during driving of the motor vehicle, e.g., for correcting a fault memory" (¶ 0007).

With respect to the Appellants' "transmission control resettable to a basic setting" limitation the Examiner argues (Ans. 11):

The broadly claimed limitation is currently being interpreted as any operation. Sponable teaches a "reset operation," wherein the transmission control can be set to a basic setting (Neutral). Also, to satisfy applicant's argument with regard to the literal definition of the word "reset," this setting (Neutral) can be "set again," as the transmission can be shifted in and out of Neutral several times.

The Examiner further argues that "Applicant has not incorporated any of the details of the 'reset operation' (or 'reset') from the specification into the claim. This limitation is merely a label." *See id.*

The Examiner has not addressed the disclosures in the Appellants' Specification that the transmission control reset is "to a fixedly-defined basic setting" (¶ 0006) and that the reset may occur "for correcting a fault memory" (¶ 0007), and explained why, in view of those disclosures, one of ordinary skill in the art, when giving "reset" its broadest reasonable interpretation in view of the Appellants' Specification, would have considered that term to be merely a label or to include "any operation" as argued by the Examiner (Ans. 11), such as shifting into and out of neutral.

Consequently, the Examiner has not established a prima facie case of obviousness of the Appellants' claimed invention.

The dissent argues that "reset", as argued by the Appellants (Br. 5), means "to set again", and that the Examiner did not err in construing "reset"

as encompassing shifting from drive to neutral.

As pointed out above, during patent prosecution, claims are to be given their broadest reasonable interpretation consistent with the Specification, as the claim language would have been read by one of ordinary skill in the art in view of the Specification. See Zletz, 893 F.2d at 321; Sneed, 710 F.2d at 1548. The Appellants' Specification discloses that a transmission control may be an electronic control system, situated in the supply circuit of a vehicle battery, and that such an electronic control system may be reset to a fixedly-defined basic setting using a reset device, or can be reset to correct a fault memory (Spec. ¶¶ 0006, 0007, 0036). Although the Appellants' Specification does not disclose what the basic setting is, it does disclose that the transmission control is an electronic device resettable to some basic setting. The Appellants' Specification further states that "[t]he transmission control is not able to output control signals to the holding magnet during the reset, so that the possibility exists that the holding magnet is not supplied with power during the reset and therefore the parking pawl could become engaged unintentionally during the reset via the spring-type actuator" (Spec. ¶ 0006). Thus, the Appellants' Specification indicates that the transmission control is a device which outputs control signals to a parking brake lock's holding magnet, but cannot do so during a transmission control reset. The Examiner has not established that a device exists that outputs control signals to a parking brake lock's holding magnet but cannot do so during what the Examiner argues is a "reset", i.e., a shifting into and out of "neutral" (Ans. 7, 11). The Examiner's interpretation of "reset", therefore, does not appear to be reasonable in view of the Appellants' Specification. Furthermore, the Examiner has not provided evidence that

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"reset", in the context of a transmission control, was known in the art to have the meaning argued by the Examiner.

The dissent argues that "even if the term 'reset' were construed as a condition wherein the signal or power output from the transmission control to the parking brake actuator is decreased, or even lost entirely, as may occur during a reset in the particular embodiment disclosed by the Appellants' (Specification ¶ 0040), Gierer contemplates such a circumstance, and provides a parking lock magnet control device that provides current, from the vehicle battery (col. 1, 1l. 25-28), during such reset."

"Reset", as that term is used by the Appellants, is not a condition wherein power is lost. The reset is a setting again to a fixedly-defined basic setting, and the momentary power loss to the parking brake's holding magnet is a condition corresponding to the reset (Spec. ¶ 0006, 0015). Gierer does not disclose a transmission control reset. Gierer discloses that if the hydraulic pressure in piston chamber 11 drops while the engine is off, spring 6 cannot activate parking brake 18 because energized magnet 5 holds stud 1 in the position shown in figure 1 such that locking system 13 prevents piston 2 from moving (col. 2, Il. 57-62). Assuming that Gierer's control device 19 is a transmission control, if it reset, as that term is used by the Appellants, the output signal to magnet 5 would be momentarily lost and, as a result, stud 1 could move to the left of the position shown in figure 1, thereby releasing locking mechanism 13 such that spring 6 can activate the parking brake. That undesired parking brake activation is what the Appellants' invention prevents (Spec. ¶ 0010).

For the above reasons we are not persuaded by the dissent of error in our decision.

DECISION

The rejections under 35 U.S.C. § 103 of claims 1, 2, 6, and 14-16 over Gierer in view of Sponable, and claims 4 and 5 over Gierer in view of Sponable and Knappe are reversed.

REVERSED

BAHR, Administrative Patent Judge, dissenting.

The majority concludes that "the Examiner has not established a prima facie case of obviousness of the Appellants' claimed invention" because the Examiner has not explained why, in view of the disclosures in, the Appellants' Specification (¶ 0006 and 0007) alluded to by the majority, "one of ordinary skill in the art, when giving 'reset' its broadest reasonable interpretation in view of the Appellants' Specification, would have considered that term to be merely a label or to include 'any operation' as argued by the Examiner (Ans. 11), such as shifting into and out of neutral." In my opinion, as more fully explained below, that conclusion is flawed.

When construing claim terminology in the United States Patent and Trademark Office, claims are to be given their broadest reasonable interpretation consistent with the specification, reading claim language in light of the specification as it would be interpreted by one of ordinary skill in the art. *In re Am. Acad. of Sci. Tech. Ctr.*, 367 F.3d 1359, 1364 (Fed. Cir. 2004). We must be careful not to read a particular embodiment appearing in the written description into the claim if the claim language is broader than the embodiment. *See Superguide Corp. v. DirecTV Enterprises, Inc.*, 358 F.3d 870, 875 (Fed. Cir. 2004) ("Though understanding the claim language may be aided by the explanations contained in the written description, it is important not to import into a claim limitations that are not a part of the claim. For example, a particular embodiment appearing in the written description may not be read into a claim when the claim language is broader than the embodiment.") The challenge is to interpret claims in view of the

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specification without unnecessarily importing limitations from the specification into the claims. *See E-Pass Techs., Inc. v. 3Com Corp.*, 343 F.3d 1364, 1369 (Fed. Cir. 2003).

The claim term on which the Appellants, the Examiner, and the majority focus is "reset." The term "reset" is conventionally understood to mean "to set again." *See, e.g., Webster's New World Dictionary* 1209 (David B. Guralnik ed., 2nd Coll. Ed., Simon & Schuster, Inc. 1984). Indeed, this is the definition urged by the Appellants (Appeal Br. 7). Further, I find nothing in the Appellants' Specification that dictates a narrower reading of this terminology.

The majority criticizes the Examiner for not addressing two particular disclosures in the Appellants' Specification when construing the claim terminology "reset." The first disclosure alluded to by the majority reads "[s]uch electronic control systems may be reset to a fixedly-defined basic setting using a reset device" (Specification ¶ 0006). The second disclosure reads, in its entirety,

such a reset may also occur during driving of the motor vehicle, e.g., for correcting a fault memory, so that precautions must be taken so that the parking lock is only engaged when this is the driver's intent and is passed on to the magnet by the transmission control, or when the power supply from the vehicle system voltage fails and the parking pawl is to be engaged to avoid accidental rolling away of the vehicle.

Specification ¶ 0007.

I find in these disclosures neither an express nor an implied definition of the term "reset." In fact, the Appellants' use of the term "may" in discussing the reset implies that the described reset may be exemplary only

and that other types of resets may be contemplated. Moreover, even if these disclosures are viewed as definitional, they do not define or limit what is meant by "a fixedly-defined basic setting." Nor do claims 1 and 14 define or further limit what is meant by "a fixedly-defined basic setting." Consequently, in my opinion, neither of the disclosures alluded to by the majority demonstrates error in the Examiner's construction of "reset" as encompassing the shifting (resetting) of the transmission control from a first status in which it has set the transmission into one gear range, such as "Drive," to a different status (a fixedly-defined basic setting) in which it sets the transmission into another gear range, such as "Neutral."

The majority observes that

the Appellants' Specification indicates that the transmission control is a device which outputs control signals to a parking brake lock's holding magnet, but cannot do so during a transmission control reset. The Examiner has not established that a device exists that outputs control signals to a parking brake lock's holding magnet but cannot do so during what the Examiner argues is a "reset", i.e., a shifting into and out of "neutral."

This appears to me to be an attempt to import into claims 1 and 14 limitations from the Appellants' Specification that are not a part of the claims. This is just what our reviewing court cautions us against doing in *Superguide* and *E-Pass*.

Moreover, even if the term "reset" were construed as a condition wherein the signal or power output from the transmission control to the parking brake actuator is decreased, or even lost entirely, as may occur during a reset in the particular embodiment disclosed by the Appellants (Spec. ¶ 0040). Gierer contemplates such a circumstance, and provides a

parking lock magnet control device that provides current, from the vehicle battery (col. 1, Il. 25-28), during such reset. Specifically, Gierer teaches that if the hydraulic pressure (the control signal or power) in the piston chamber 11 (the parking brake disengagement actuator) drops while the internal combustion engine of the vehicle is switched off, the magnet 5, still supplied with current, will retain the stud 1 in position to cause locking system elements 4 to retain piston 2 in its position. Consequently, the tension of spring 6 cannot activate the parking brake 18. Gierer, col. 2, Il. 33-62. In effect, Gierer's parking brake lock "bridges" or crosses the reset (loss of power) to maintain a power supply to the holding magnet 5 during the reset operation.

The majority addresses a different situation, namely, the situation wherein Gierer's magnet 5 is not supplied with current, thereby permitting stud 1 to move to the left of the position shown in Gierer's Figure 1, thereby releasing locking mechanism 13 such that the tension of spring 6 can activate the parking brake 6. The majority goes on to point out that such "undesired brake activation is what the Appellants' invention prevents (Spec. ¶ 0010)." While this may be the case, the Appellants' invention as claimed² in claims 1 and 14 does not require that the reset operation cause the transmission control to stop supply of current to the magnet. To the contrary, claims 1 and 14 both require that the power supply to the magnet be maintained during the reset operation.

For the above reasons, the majority's stated rationale for concluding that the "the Examiner has not established a prima facie case of obviousness

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 $^{^2}$ As stated by our reviewing court in *In re Hiniker Co.*, 150 F.3d 1362, 1369 (Fed. Cir. 1998), "the name of the game is the claim."

of the Appellants' claimed invention" and reversing the Examiner's rejections is, in my opinion, flawed. As such, I cannot join in the majority's opinion. Moreover, for the reasons that follow, I am not persuaded by the Appellants' remaining arguments that the Examiner's rejections are in error.

The Appellants argue that Gierer does not teach or disclose control device 19 controlling the transmission; rather, control device 19 merely controls the parking gear 16 for the transmission 20 (Appeal Br. 4, 6). While the Appellants correctly point out that Gierer only discloses the role control device 19 plays in the actuation of parking brake 18, Gierer refers to the parking brake 18 and the accumulator 3 as the parking brake and accumulator for the automatic transmission (col. 1, ll. 9-10; col. 2, ll. 24-25 and 65-67). Accordingly, a person of ordinary skill in the art would understand Gierer's control device 19 to be a "transmission control" as required in claims 1 and 14. Moreover, even if the claim terminology "transmission control" were construed as requiring a control device that controls other aspects of the transmission, such as the gear range positioning, in addition to the parking brake and parking lock, a person of ordinary skill in the art would have inferred that Gierer's control device 19 either is a controller for the entire automatic transmission or is controlled by such a controller.3 To the extent that this would not have been clear from the teachings of Gierer alone, the Examiner relies on Sponable for a teaching to control the parking brake and parking lock via the electronic control unit (ECU) 18 of the transmission, that is, the control unit that coordinates

³ An artisan must be presumed to know something about the art apart from what the references disclose. *See In re Jacoby*, 309 F.2d 513, 516 (CCPA 1962).

shifting of the transmission between gear ranges such as "Park," "Reverse," "Neutral,", "Drive," etc., as well as the park lock actuator (col. 3, ll. 41-43, 52-65; col. 5, ll. 15-24).

The Appellants argue, in essence, that because of the differences in operation of the parking locks of Gierer and Sponable, "one of skill in the art would not have modified Gierer to provide 'an apparatus for bridging a reset operation of the transmission control, the apparatus maintaining a power supply of the holding magnet during the reset operation." (Appeal Br. 5, 6, 7, and 8). As the Examiner repeatedly points out (Ans. 5, 10), the Examiner's rejection does not propose combining the structures of the parking lock mechanisms of Gierer and Sponable; rather, the Examiner's rejection combines the overall transmission control of Sponable with the parking lock/parking brake actuating device of Gierer. As should be apparent from my discussion in the preceding paragraph, I find this combination to be nothing more than the predictable use of prior art elements according to their established functions or the mere application of a known technique to a piece of prior art ready for the improvement. See KSR Int'l. Co. v. Teleflex Inc., 127 S.Ct. 1727, 1740 (2007).

For the above reasons, I would affirm the Examiner's rejection under 35 U.S.C. § 103(a) of independent claims 1 and 14, and dependent claims 2, 6, 15, and 16, for which the Appellants have not presented any separate arguments apart from claims 1 and 14, as unpatentable over Gierer in view of Sponable. In contesting the rejection of claims 4 and 5 as unpatentable over Gierer in view of Sponable and Knappe, the Appellants merely rely on their arguments directed to claims 1 and 14. Accordingly, I would affirm this rejection as well.

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